## **Exhibit 300: Capital Asset Summary**

### Part I: Summary Information And Justification (All Capital Assets)

#### Section A: Overview & Summary Information

Date Investment First Submitted: 2009-06-30
Date of Last Change to Activities: 2012-08-22
Investment Auto Submission Date: 2012-02-29
Date of Last Investment Detail Update: 2012-02-24
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Date of Last Revision: 2012-08-22

**Agency:** 024 - Department of Homeland Security **Bureau:** 58 - Customs and Border Protection

**Investment Part Code: 01** 

**Investment Category:** 00 - Agency Investments

1. Name of this Investment: CBP - Tactical Communications (TACCOM) Modernization

2. Unique Investment Identifier (UII): 024-000005064

Section B: Investment Detail

1. Provide a brief summary of the investment, including a brief description of the related benefit to the mission delivery and management support areas, and the primary beneficiary(ies) of the investment. Include an explanation of any dependencies between this investment and other investments.

CBP is responsible for securing the nation?s borders against illegal entry of people and goods while managing legitimate travel and trade. To support this mission, CBP operates and maintains one of the largest Land Mobile Radio (LMR) tactical voice communications infrastructures in the Federal government. Tactical communications capabilities are essential to coordinating mission activities and protecting the safety of over 44,000 CBP law enforcement agents and officers. These agents and officers operate in remote areas where their radio is often their only communications channel to coordinate activities or summon assistance. However, much of the LMR equipment currently in use has surpassed its expected service life, does not provide sufficient coverage in remote locations, and is not compliant with current mandates concerning narrowbanding and encryption. CBP?s Tactical Communications Modernization (TACCOM) program began as a nationwide effort to implement digital Project 25, Advanced Encryption Standard narrowband systems with improved coverage and capacity. It currently has active projects in the Tucson, Yuma, Houlton, El Paso, and Rio Grande Valley Sectors. ""At the outset of the project, there were no options for providing wireless communications in the remote areas of CBP operations other than government-owned LMR. However, recent developments in LTE technologies as well as efforts within Congress and the Administration to fund a nationwide broadband public safety network have opened new broadband wireless network options. This approach has several

potential advantages, including broadband data and video capabilities in addition to narrowband voice; alleviation of spectrum shortages in the VHF band, and potential to provide and enterprise DHS wide solution. CBP received an ADE1 decision in 2011 to pursue this approach, called TACCOM2, and to establish it as a Department-wide project. TACCOM has thus been rescoped from a nationwide modernization and expansion of CBP systems to TACCOM1 - the completion of projects already underway, capped by a digital-in-place (DIP) upgrade or replacement of any remaining analog equipment. This Exhibit 300 will focus on the contracts, milestones, and performance standards for TACCOM1, while indicating that future year funding may be redirected to TACCOM2. A separate DHS-level Exhibit 300 for TACCOM2 will be created in the in FY14 cycle".

How does this investment close in part or in whole any identified performance gap in support of the mission delivery and management support areas? Include an assessment of the program impact if this investment isn't fully funded.

TACCOM1 provides direct support to DHS Mission #2, Securing and Managing our Borders. By improving coverage, capacity, reliability, and encryption, the modernization effort provides critical communications support to the agents and officers who secure the nation's borders. If the program is not fully funded, CBP will likely have to prioritize the completion of ongoing modernization projects in Houlton, El Paso, and Rio Grande Valley, and delay deployment of the digital-in-place (DIP) project (the Tucson and Yuma modernization projects are in IOC). This would delay several operational and policy requirements, as indicated below: Uniform Technology Platform. CBP requires a uniform technology platform. LMR systems in use in CBP cover a variety of technology platforms. Bringing the enterprise to a common digital platform will simplify and improve operations, training, interoperability between sectors, and systems sustainment, as well as allowing for a Radio Over IP (ROIP) platform that will pave the way for interoperability solutions along and across the borders. Availability. CBP requires high reliability and availability of LMR systems. Existing analog hardware has been in service since the late eighties and is failing at an increasing rate resulting in more downtime. Cannibalization of equipment is the only option for maintaining this antiquated hardware and supplies are dwindling. The failure rate is roughly 6 to 1 when compared to newer equipment. AES Protection. DHS Management Directive 4300A, Sensitive Systems Handbook, requires AES encryption for Sensitive Systems. The DES Encryption used on analog system degrades coverage by up to 35%, so that agents are often Narrowband Compliance. CBP has failed to meet the forced to operate in the clear. National Telecommunications and Information Administration (NTIA) narrowbanding deadlines for Federal land mobile radio systems. The new deadline is FY2013. If CBP remains out of compliance, it will experience interoperability problems with partner agencies who have met the deadline. Improved Interoperability. The 9/11 Commission Report cited failures in public safety communications, particularly in interoperable communications between responders, as a significant issue in the 9/11 response. TACCOM1 addresses the first step for improving interoperability by bringing the full CBP LMR baseline to a P25 standard.

3. Provide a list of this investment's accomplishments in the prior year (PY), including projects or useful components/project segments completed, new functionality added, or operational efficiency achieved.

CBP made a significant number of key accomplishments in FY11. In Rio Grande Valley,

TACCOM completed project kickoff, Project Documentation, and Critical Design Review milestones. In Arizona, TACCOM completed Operational Readiness Review and transition to sustainment of 72 sites, supporting appproximately 7,000 subscriber units. In Houlton, TACCOM completed environmental work and Critical Design Review, and begin site construction at 20 sites. In El Paso, TACCOM completed Critical Design Review.

- 4. Provide a list of planned accomplishments for current year (CY) and budget year (BY).
  - FY12 · Complete RF site buildout, fixed network equipment installation, user training, and cutover to new systems in Houlton, El Paso, and Rio Grande Valley · Conduct infrastructure upgrades at the National Law Enforcement Communications Center needed to support the modernized infrastructure to be deployed as part of the Digital in Place modernization · Conduct Digital in Place modernization in the RGV2 sector · Conduct laboratory proof-of-concept for Technology Demonstrators · Stand up the Joint Program Office for TACCOM2 FY13 · Complete close-out activities in Houlton, El Paso, and Rio Grande Valley · Substantially complete the DIP modernization · Begin fielding of Technology Demonstrators.
- 5. Provide the date of the Charter establishing the required Integrated Program Team (IPT) for this investment. An IPT must always include, but is not limited to: a qualified fully-dedicated IT program manager, a contract specialist, an information technology specialist, a security specialist and a business process owner before OMB will approve this program investment budget. IT Program Manager, Business Process Owner and Contract Specialist must be Government Employees.

2011-05-23

#### Section C: Summary of Funding (Budget Authority for Capital Assets)

1.

Table I.C.1 Summary of Funding										
	PY-1 & Prior	PY 2011	CY 2012	BY 2013						
Planning Costs:	\$0.0	\$0.0	\$0.0	\$0.0						
DME (Excluding Planning) Costs:	\$219.8	\$40.0	\$40.0	\$40.0						
DME (Including Planning) Govt. FTEs:	\$6.9	\$8.2	\$6.9	\$7.0						
Sub-Total DME (Including Govt. FTE):	\$226.7	\$48.2	\$46.9	\$47.0						
O & M Costs:	\$8.3	\$2.7	\$20.7	\$16.8						
O & M Govt. FTEs:	\$0.0	\$0.0	\$0.0	\$0.0						
Sub-Total O & M Costs (Including Govt. FTE):	\$8.3	\$2.7	\$20.7	\$16.8						
Total Cost (Including Govt. FTE):	\$235.0	\$50.9	\$67.6	\$63.8						
Total Govt. FTE costs:	\$6.9	\$8.2	\$6.9	\$7.0						
# of FTE rep by costs:	33	55	65	65						
Total change from prior year final President's Budget (\$)		\$0.0	\$-5.6							
Total change from prior year final President's Budget (%)		0.00%	-8.00%							

# 2. If the funding levels have changed from the FY 2012 President's Budget request for PY or CY, briefly explain those changes:

TACCOM's FYHSP has been adjusted to account for new FTEs received and adjustments to BSFIT funding slated for the program.

#### Section D: Acquisition/Contract Strategy (All Capital Assets)

	Table I.D.1 Contracts and Acquisition Strategy										
Contract Type	EVM Required	Contracting Agency ID	Procurement Instrument Identifier (PIID)	Indefinite Delivery Vehicle (IDV) Reference ID	IDV Agency ID	Solicitation ID	Ultimate Contract Value (\$M)	Туре	PBSA ?	Effective Date	Actual or Expected End Date
Awarded	7014	HSBP1010C0 0056									
Awarded	7014	HSBP1008J23 197	HSSS0106D00 05	7009							
Awarded	7014	HSBP1008C0 2005									
Awarded	7014	HSBP1010C0 0089									
Awarded	7014	HSBP1009J26 296	HSBP1007D01 587	7014							
Awarded	7014	HSBP1010J00 580	HSHQDC06D00 040	7001							
Awarded	7014	HSBP1010J00 621	HSHQDC06D00 026	7001							
Awarded	7014	HSBP1011J00 905	HSHQDC07D00 024	7001							
Awarded	7014	HSBP1012J00 082									
Awarded	7014	HSBP1012P00 117									
Awarded	7014	HSBP1010F00 278									

#### 2. If earned value is not required or will not be a contract requirement for any of the contracts or task orders above, explain why:

Overall, the TACCOM contracts are for the purchase and integration of COTS land mobile radio components and supporting facilties. TACCOM has focused Earned Value requirements on high-risk contracts (e.g., the cost plus contract awarded for El Paso). For the Firm Fixed Price contracts (which constitute 62% of the planned or awarded dollars), TACCOM uses methods other than earned value to manage vendors and assess progress. TACCOM has added more experienced COTR resources to its staff. In addition, TACCOM egular status

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meetings with all vendors, and vendors attend the monthly Project Management Reviews with the Assistant Commissioner OIT. All invoices from these contracts are vetted through a review process that ensures the government is satisfied that the deliverables were complete, correct, and accepted. Using this data and project schedules, project managers are able to report on cost and schedule performance, and do track SPI. Furthermore, three of the FFP contracts consist almost entirely of commercial-off-the-shelf equipment procurement, so EVM would not necessarily help in contract management. Finally, EVM has not been a requirement of project management office support contracts. These contracts provide level-of-effort support to the TACCOM PMO, and are not structured along billable milestones. These vendors provide monthly reports documenting the work performed during the billing periods. Within FY12 Q1, these contracts will be replaced with a performance-based, FFP contract.

# **Exhibit 300B: Performance Measurement Report**

Section A: General Information

**Date of Last Change to Activities: 2012-08-22** 

Section B: Project Execution Data

		Table II.B.	1 Projects		
Project ID	Project Name	Project Description	Project Start Date	Project Completion Date	Project Lifecycle Cost (\$M)
3	Houlton	This project is upgrading the Land Mobile Radio (LMR) system used by CBP agents and officers in the Houlton sector. The project will provide a P25, AES system with improved coverage and reliability.			
1	El Paso	This project is upgrading the Land Mobile Radio (LMR) system used by CBP agents and officers in the El Paso sector. The project will provide a P25, AES system with improved coverage and reliability.			
2	Rio Grande Valley	This project is upgrading the Land Mobile Radio (LMR) system used by CBP agents and officers in the Rio Grande Valley. The project will provide a P25, AES system with improved coverage and reliability.			
4	Digital in Place	This project will upgrade all remaining legacy analog sites in CBP.			

#### **Activity Summary**

#### Roll-up of Information Provided in Lowest Level Child Activities

Project ID	Name	Total Cost of Project Activities (\$M)	End Point Schedule Variance (in days)	End Point Schedule Variance (%)	Cost Variance (\$M)	Cost Variance (%)	Total Planned Cost (\$M)	Count of Activities
3	Houlton							
1	El Paso							
2	Rio Grande Valley							
4	Digital in Place							

				Key Deliverables				
Project Name	Activity Name	Description	Planned Completion Date	Projected Completion Date	Actual Completion Date	Duration (in days)	Schedule Variance (in days)	Schedule Variance (%)
2	RGV System Design	Complete system design and Bill of Materials for RGV	2011-07-18	2011-07-18	2011-07-18	256	0	0.00%
3	Houlton System Design	Complete Critical Design Review	2011-07-31	2011-07-31	2011-07-31	211	0	0.00%
3	Houlton System Staging	Complete factory staging of LMR and PTP equipment	2011-08-18	2011-08-18	2011-08-18	22	0	0.00%
2	RGV Civil Equipment Procurement	Complete procurement of civil equipment for each of the 52 sites in the SOW	2011-09-30	2012-08-21		91	-336	-369.23%
4	Commodity Buy	Award contract for digital in place commodity purchases	2011-09-30	2013-03-29		1	-546	-54,600.00%
3	Houlton Environmental	Complete environmental paperwork for Houlton	2011-10-31	2012-03-31	2012-03-31	486	-152	-31.28%
2	RGV Site Design and BOM	Complete site designs	2011-11-22	2011-11-22	2011-06-30	357	145	40.62%
3	Houlton Year 1 civil buildout	Complete civil buildout of first 20 sites	2011-11-30	2012-07-30	2012-07-30	217	-243	-111.98%

				Key Deliverables				
Project Name	Activity Name	Description	Planned Completion Date	Projected Completion Date	Actual Completion Date	Duration (in days)	Schedule Variance (in days )	Schedule Variance (%)
2	RGV Fixed Network Equipment Procurement	Complete procurement of fixed network equipment for each of the 52 sites in the RGV SOW	2011-12-01	2012-01-20	2012-01-20	153	-50	-32.68%
1	ELP Design	Complete Critical Design Reviews, Construction Readiness Reviews, and security documents	2012-01-19	2012-04-19	2012-05-04	112	-106	-94.64%
2	RGV Staging	Complete staging of LMR and PTP equipment	2012-02-18	2012-08-30		121	-195	-161.16%
3	Houlton Year 2 site buildout	Complete civil buildout of 40 sites	2012-03-30	2012-09-30		242	-184	-76.03%
2	RGV Civil Installation	Complete installation of RGV civil infrastructure	2012-06-30	2012-10-15		313	-107	-34.19%
2	RGV FNE Installation	Complete installation of RGV fixed network equipment	2012-07-31	2012-10-23		348	-84	-24.14%
3	Houlton LMR install	Install, optimize, and accept LMR equipment by site	2012-07-31	2012-10-15		281	-76	-27.05%
3	Houlton PTP Backhaul Install	Install, optimize, and site accept Houlton backhaul PTP equipment	2012-07-31	2012-11-30		281	-122	-43.42%

#### Section C: Operational Data

	Table II.C.1 Performance Metrics									
Metric Description	Unit of Measure	FEA Performance Measurement Category Mapping	Measurement Condition	Baseline	Target for PY	Actual for PY	Target for CY	Reporting Frequency		
Percent of Focus Areas in which regional CBP LMR systems provide at least 95% of user-defined RF coverage requirements, according to system acceptance tests.	Percent	Mission and Business Results - Services for Citizens	Over target	0.000000	0.000000	0.000000	10.000000	Semi-Annual		
Percent of Focus Areas in which customer close-out surveys average 75% ratings of "agree" or "strongly agree"	Percent	Customer Results - Customer Benefit	Over target	0.00000	0.00000	0.000000	10.000000	Semi-Annual		
Percent of time nationwide LMR systems are available	Percent	Technology - Reliability and Availability	Over target	90.00000	90.000000	95.000000	95.000000	Monthly		
Percent of push-to-talk voice transmissions nationwide that are encrypted	Percent	Process and Activities - Security and Privacy	Over target	78.000000	78.300000	78.300000	78.300000	Monthly		
Percent of encrypted push-to-talks that are Advanced Encryption Standard (AES) (as opposed to older encryption)	Percent	Process and Activities - Security and Privacy	Over target	27.200000	69.170000	69.170000	76.960000	Monthly		